# LITHIUM SECONDARY BATTERY

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**Classification:**

**- international:** ***H01M10/40; H01M4/02; H01M4/58;*** **H01M10/36; H01M4/02; H01M4/58;** (IPC1-7): H01M4/02; H01M4/58; H01M10/40

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Abstract of **JP2003142075**

PROBLEM TO BE SOLVED: To provide an inexpensive lithium secondary battery having high energy density and high safety without easily causing capacity deterioration even in storing the battery in a high-temperature atmosphere. SOLUTION: This lithium secondary battery is provided with a negative electrode comprising copper foil and a negative electrode mix layer formed on the copper foil and having a density of 1.4-1.8 g/cm<3> , a positive electrode comprising aluminum foil and a positive electrode mix layer formed on the aluminum foil and having a density of 3.3-3.7 g/cm<3> , and a nonaqueous electrolyte. The negative electrode mix layer comprises graphite and graphatization retarding carbon. The positive electrode mix layer is formed of at least one kind selected from among a group comprising an active material (a) comprising LiMn2 O4 and LiNiO2 , an active material (b) formed of LiMnx Ni1-x O2 , an active material (c) comprising LiMn2 O4 , LiNiO2 and LiCoO2 , and an active material (d) formed of LiMny Niz Co1-y-z .